

What is claimed is:

1. A trade-in battery system wherein used secondary batteries are purchased and sold after being charged, comprising:

5       a purchasing step for purchasing used secondary batteries;

        a pre-storage deterioration inspection step for inspecting said purchased used secondary batteries;

        a charging step for charging said inspected used  
10 secondary batteries;

        a storage step for storing said charged used secondary batteries;

        a packaging step for packaging said stored used secondary batteries; and

15       a selling step for selling said packaged used secondary batteries.

2. The trade-in battery system according to claim 1, further comprising:

20       at least one of a battery visual inspection step and a storage deterioration inspection step.

3. The trade-in battery system according to claim 2, wherein:

25       the purchasing step, the pre-storage deterioration inspection step, the charging step, the storage step, the battery visual inspection step, the packaging step, and the selling step are carried out in this order, or the purchasing step, the pre-storage deterioration inspection step, the  
30 storage step, the storage deterioration inspection step, the charging step, the packaging step, and the selling step are

carried out in this order.

4. The trade-in battery system according to claim 1, wherein:

5       the pre-storage deterioration inspection step includes a step for charging-discharging frequency checking.

5. The trade-in battery system according to claim 1, further comprising:

10       a step for memory effect checking after the pre-storage deterioration inspection step, wherein

the battery suffering from a memory effect is subjected to refresh discharge.

15       6. The trade-in battery system according to claim 1, wherein:

the battery rejected in the pre-storage deterioration inspection step is provided with a marking which identifies a battery failure.

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7. The trade-in battery system according to claim 1, wherein:

the storage step is carried out by storing the charged secondary battery in a temperature-controlled environment.

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8. The trade-in battery system according to claim 1, wherein:

the packaging step includes a film packaging step which covers the secondary batteries being charged so as to be in close contact with the outer surface of the secondary batteries, and optionally a product packaging step which

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covers the charged secondary batteries so as not to be in close contact with the outer surface of the secondary batteries.

9. The trade-in battery system according to claim 8,  
5 wherein:

the film packaging step simultaneously covers a positive electrode terminal and a negative electrode terminal of each of the secondary batteries with a heat-shrinkable polymer film in a sash-like form.

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10. The trade-in battery system according to claim 9,  
wherein:

the heat-shrinkable polymer film is a film having perforation in the widthwise direction.

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11. The trade-in battery system according to claim 9,  
wherein:

the heat-shrinkable polymer film is provided with an identifying code which indicates at least the battery  
20 individual and the condition of the charged secondary batteries.

12. The trade-in battery system according to claim 8,  
wherein:

25 one of an indication which identifies a secondary battery for trade-in battery, a charging date indication, a storage end date indication, and an indication which identifies a store dealing in secondary batteries for trade-in battery is provided to one of the film packaging and  
30 the product packaging.

13. A method for film-packaging a secondary battery, comprising:

simultaneously covering a positive electrode terminal and a negative electrode terminal of a charged secondary battery with a heat-shrinkable polymer film in a sash-like form.

14. The method for film-packaging a secondary battery according to claim 13, wherein:

the heat-shrinkable polymer film is a film in a sash-like form having perforation in the widthwise direction.

15. A trade-in battery system apparatus, wherein:

a purchasing step for purchasing used secondary batteries; a pre-storage deterioration inspection step for inspecting said purchased used secondary batteries; a charging step for charging said inspected used secondary batteries;

a storage step for storing said charged used secondary batteries; a packaging step for packaging said stored used secondary batteries; a selling step for selling said packaged used secondary batteries to provide a packaged and charged secondary batteries in an outlet are automatically conducted after used secondary batteries are put in an inlet.

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16. The trade-in battery system apparatus according to claim 15, wherein:

at least one of a step for battery visual inspection and a step of storage deterioration inspection step is further automatically conducted.

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